NORTH CAROLINA DIVISION OF AIR QUALITY

Air Permit Review

Permit Issue Date:

Region: Washington Regional Office
County: Hertford
NC Facility ID: 4600107
Inspector's Name: Betsy Huddleston
Date of Last Inspection: 05/05/2015
Compliance Code: 3 / Compliance - inspection

Facility Data

Applicant (Facility's Name): Enviva Pellets Ahoskie, LLC

Facility Address:
Enviva Pellets Ahoskie, LLC
142 NC Route 561 East
Ahoskie, NC 27910

SIC: 2499 / Wood Products, Nec
NAICS: 321999 / All Other Miscellaneous Wood Product Manufacturing

Facility Classification: Before: Title V **After:** Title V
Fee Classification: Before: Title V **After:** Title V

Permit Applicability (this application only)

SIP: 15A NCAC 02Q .0504, 15A NCAC 02Q .0521, 15A NCAC 02Q .0522
NSPS:
NESHAP:
PSD:
PSD Avoidance:
NC Toxics: 15A NCAC 02D .1100, 15A NCAC 02Q .0711
112(r):
Other:

Contact Data

Facility Contact	Authorized Contact	Technical Contact
Joe Harrell Corporate EHS Manager (252) 209-6032 142 NC Route 561 East Ahoskie, NC 27910	Jason Ansley Plant Manager (252) 209-6032 142 NC Route 561 East Ahoskie, NC 27910	Joe Harrell Corporate EHS Manager (252) 209-6032 142 NC Route 561 East Ahoskie, NC 27910

Application Data

Application Number: 4600107.12A
Date Received: 11/13/2012
Application Type: Modification
Application Schedule: TV-1st Time

Existing Permit Data
Existing Permit Number: 10121/R03
Existing Permit Issue Date: 05/22/2015
Existing Permit Expiration Date: 11/30/2015

Total Actual emissions in TONS/YEAR:

CY	SO2	NOX	VOC	CO	PM10	Total HAP	Largest HAP
2014	19.20	85.15	201.54	31.34	123.82	10.80	4.76 [Methanol (methyl alcohol)]
2013	8.70	100.74	56.47	37.13	113.65	15.70	5.86 [Formaldehyde]
2012	17.50	79.88	24.79	29.83	113.93	8.86	2.35 [Formaldehyde]
2011	1.10	13.50	16.30	18.90	12.60	---	--- [---]

Review Engineer: Yukiko (Yuki) Puram

Review Engineer's Signature: **Date:**

Comments / Recommendations:
Issue 10121/T04
Permit Issue Date:
Permit Expiration Date:

I. Purpose of Application

Enviva Pellets Ahoskie, LLC (Enviva) currently holds Air Permit 10121R03. Per 15A NCAC 02Q .0504, the facility is allowed to construct and operate under 15A NCAC 02Q .0300 when a Title V permit application is submitted within one year from the date of beginning of operation. Operation of the facility commenced on November 22, 2011 and the first time Title V application (4600107.12A) was received on November 13, 2012, which was within the time period allowed. Because the facility's operation and the sources were modified several times since the first time Title V application being submitted, an amended first time Title V application was filed on June 22, 2015. According to the application, the operation of the facility is the same as described in the application for R03 (4600107.15A).

The facility also submitted a renewal to the current state permit R03 on October 6, 2015. However, in accordance to NCGS 150B-3(a), when a sufficient application was submitted to the agency in a timely manner, the existing permit does not expire until a decision on the application is finally made by the agency. Because the application for first time Title V was submitted on time, the applicant does not need to submit a renewal application to the state permit R03. Therefore, the application 4600107.15B will be consolidated to the first time title V application, 4600107.12A.

II. Facility Description

Enviva is a wood pellets manufacturing plant located in Ahoskie, Hertford County in NC. The wood pellets are used as a renewable fuel for energy generation in place of coal. Most of their products are shipped to Europe to be used as energy source. At the time of the application, the wood mixture that goes into the dryer is consisted of 70% hardwood and 30% softwood. In addition to the dried wood pieces that are processed on site, Enviva also uses dry wood chips that are purchased from off-site. Combining the wood chips from on-site and off-site, the final pellets consist of approximately 60% hardwood and 45% softwood.

III. History/Background/Application Chronology

December 7, 2010	The R00 permit was issued with a requirement to submit a First Time Title V application within a year of startup.
October 25, 2011	Enviva submitted application 4600107.11A.
November 22, 2011	Operation of the Enviva Pellets Ahoskie site was commenced.
January 3, 2012	Permit R01 was issued in response to application 11A. This permit changed the configuration of several control devices and incorporated modeling.
November 13, 2012	First time Title V permit application, 4600107.12A, was submitted.
April 8, 2013	Enviva submitted a letter to DAQ indicating the VOC emissions in the previous applications may be underestimated. The VOC emissions of similar facilities will be used to compare to their emissions described in the permit application.
December 10, 2013	Enviva submitted application 4600107.13A to incorporate the fugitive dust control plan.
March 10, 2014	Permit R02 was issued.

June 24-25 and July 2, 2014	A series of stack tests were conducted to measure VOC emissions from the hammermill, the pellet cooler and the dryer.
October 10, 2014	Permit application 12A was transferred to Yuki Puram.
January 9, 2015	Application 4600107.15A was submitted to increase the maximum operation rate and to increase the softwood content of the wood pellets.
February 11, 2015	DAQ's request for additional information regarding toxic emissions from the dryer was sent to Mr. Mike Deyo, consultant for Enviva.
February 13, 2015	Mr. Deyo provided test results from other Enviva facilities including some of the requested toxic emissions information. However, the test reports were not previously reviewed by DAQ. DAQ suggested Enviva submit the test report to DAQ's SSCB for review before applying the test results to the permit application.
February 25, 2015	Mr. Alan McConnell, attorney representing Enviva, contacted William Willets of DAQ regarding Enviva's toxic emissions.
April 14, 2015	Mr. Cuilla reviewed the updated permit.
April 16, 2015	Updated draft permit was sent to Mr. McConnell.
April 28, 2015	DAQ received comments from Mr. McConnell along with test reports conducted in Enviva's Amory and Wiggins sites in Mississippi.
May 22, 2015	Permit R03 issued.
June 22, 2015	An amended application to 4600107.12A was received.
October 9, 2015	The test reports conducted in the Enviva sites in Amory and Wigging, Mississippi were denied by the SSCB.
November 16, 2015	The DAQ and the Enviva staffs had a meeting to discuss toxic pollutants emissions. The staffs present at the meeting were: Mr. Steve Steigerwald of Enviva, Dr. John Richards of Air Control Techniques, Betsy Huddleston, Shannon Vogel, Mark Cuilla and Yuki Puram of DAQ.
December 18, 2015	Dr. Richards submitted an updated test report conducted at the Amory and Wiggins sites along with the document regarding benzene and other metal emissions from the Ahoskie site.
January 29, 2016	Ms. Vogel of DAQ reviewed the updated test report. She sent an email indicating that the SSCB "does not find any reason to disallow the October 2013 test results for use as supporting data for estimating emissions from the NC facilities."
February 1, 2016	Yuki Puram requested Mr. Steigerwald submit updated emission data specific to the Ahoskie site since Dr. Richards' documents did not include potential emissions at the Ahoskie site.

February 3, 2016	Mr. Joe Harrell of Enviva called DAQ to ask questions about the data requested by the email sent on February 1st. He assured that the requested data will be submitted shortly.
February 26, 2016	DAQ has not received the data requested by the email dated February 1st. Yuki Puram spoke to Mr. Harrell explaining that the emission factors from AP-42 and the modeling analysis conducted in 2011 will be used to calculate the potential emissions rather than utilizing the test data from the Amory and the Wiggins sites. Mr. Harrell agreed the calculation method that was proposed.
March 16, 2016	Mark Cuilla of DAQ reviewed the draft permit.
March 17, 2016	Yuki Puram of DAQ spoke with Mr. Harrell to correct the source ID no. and the control device ID Nos. for Hammermill area and Hammermill No. 5.
March 23, 2016	Ms. Huddleston of WaRO reviewed the draft permit and returned with comments.
April 4, 2016	Mr. Harrell sent the applicants' comments on the draft permit.

IV. Regulatory Review – Specific Emission Source Limitations

The emission sources and associated air pollution control devices and appurtenances listed below are subject to the following regulations:

A. Direct Wood-Fired Rotary Drum Drying System (ES-DRYER)

- Wood-fired dryer (ID No. ES-DRYER) with simple cyclone (ID No. CD-DC) in series with one wet electrostatic precipitator (ID No. CD-WESP)
- Dried wood day silo (ID No. ES-DWDS) with bin vent filter (ID No. CD-DWDS-BV)
- Four dry wood hammermills (ID Nos. ES-DHM-1 through ES-DHM-4) with four simple cyclones (ID Nos. CD-DHM-C1 through CD-DHM-C4) in series with two fabric filters (ID Nos. CD-DHM-FF1 and CD-DHM-FF2)
- Hammermill area and Hammermill No. 5 (ID No. ES-DHM-5) with associated cyclone (ID No. CD-DHM) in series with fabric filter (ID No. HAF-FF3)
- Pellet feed mill silo (ID No. ES-PMFS) with bin vent filter (ID No. CD-PMFS-BV)
- Five pellet coolers (ID Nos. ES-CLR1 through ES-CLR5) with two multicylones (ID Nos. CD-CLR-C1 and CD-CLR-C2) and one simple cycle (ID No. CD-CLR-3)
- Fines bin (ID No. ES-FB) with bin vent filter (ID No. CD-FB-BV)
- Finished product handling (ID No. ES-FPH), truck loadout bin (ID Nos. ES-TLB), and two pellet loadouts (ID Nos. ES-PL1, ES-PL2) all venting to bagfilter (ID No. CD-FPH-BF)

1. <u>15A NCAC 02D .0515: Particulates from Miscellaneous Industrial Processes</u>

This regulation establishes an allowable emission rate for particulate matter from any stack, vent, or outlet resulting from any industrial process for which no other emission control standards are applicable. Enviva's maximum dryer production rate is 48 ODT/hr and the emissions are controlled by the wet electrostatic precipitator (WESP). Because the facility also uses dry wood chips that are purchased from off-site, the production rate of the pellet mill system and "downstream" material handling equipment is 55 ODT/hr. No change was made with the requirements associated with this regulation. See the review R03 for particulates emissions from each emission source.

2. 15A NCAC 02D .0516: Sulfur Dioxide Emissions from Combustion Sources

This rule limits SO2 emissions from the wood-fired dryer associated with the wet electrostatic precipitator to 2.3 pounds per million Btu. SO2 emissions from the dryer system are estimated as 0.025lbs/mmBtu per AP-42 Table 1.6-2. Therefore, compliance is inherent. No testing, monitoring, recordkeeping or reporting is required.

3. 15A NCAC 02D .0521 "Control of Visible Emissions"

This regulation limits visible emissions from all of the sources at the facility to 20% opacity except one per hour and four per 24 hours 6-minute average VE may exceed 20% opacity provided VE does not exceed 87% opacity. The facility is currently required to observe VE emissions monthly from all sources and to report semiannually. No change was made.

B. Emergency Generator (ID No. ES-EG) and Fire Water Pump (ID No. ES-FWP)

The emergency generator and the fire water pump were manufactured in 2011 and 1975 respectively. Based on the generators' maximum heat inputs and 500 hours of maximum operation per year, the potential emissions of each criteria pollutants are less than 5 tpy. Therefore, these sources will be removed from the permit to the insignificant emissions list. Both engines are still subject to GACT Subpart ZZZZ. The emergency generator (ID NO. ES-EG) is also subject to NSPS Subpart IIII. Per §63.6590(c)(1), a new RICE located an area source that is also subject to NSPS Subpart IIII is not subject to further requirements under GACT. On the other hand, the fire pump (ID No. ES-FWP) which is not subject to Subpart IIII, is still subject to the GACT requirements. These requirements are attached to this review for a compliance purpose.

V. Regulatory Review – Facility-wide Sources

1. 15A NCAC 02D .0540 "Particulates from Fugitive Dust Emissions"

The facility developed a fugitive dust control plan which was revised on January 14, 2014. No change was made at this time.

2. 15A NCAC 02D .1100 "Toxic Air Pollutant Emissions Limitation and Requirement"

The facility conducted a dispersion modeling analysis for acrolein, benzene, formaldehyde, phenol and NO_2 on October 26, 2010 and March 22, 2011. In addition, arsenic, bezo(a)pyrene, cadmium, chlorine, hexa-p-dioxin and hydrogen chloride were added to the pollutants subject to 15A NCAC 02D .1100 on November 10, 2011. However, the facility indicated most of these pollutants were not emitted from the dryer based on their tests conducted at their facilities in Wiggins and Amory, Mississippi. DAQ's SSCB reviewed those stack tests conducted at the Wiggins and Amory sites by Air Control Techniques, Inc. Initially, SSCB rejected the test results because the emissions were reported as "zero" when the emissions were below the detect limits. Air Control Techniques then revised the test results and reported at the detect limits. However, the facility did not submit potential emissions at the Ahoskie facility using the emission factors measured at the facilities in Wiggins and Amory.

Instead of using the tests conducted in another facility, the modeling analysis that was previously conducted for the Ahoskie site was reviewed. The facility's permit application R01 included a modeling analysis which was reviewed on March 22, 2011. The inputs used for the modeling were based on the AP-42 emission factors for a particle board dryer. Even though the wood pelletizing operation is different than particle board manufacturing, the type of the dryer used for the particle board manufacturing was the closest they could find at that time. Table 1 shows the input that was used for the modeling in 2011, and the updated input based on the facility's current operation. Because the facility increased the production rate since 2011, the modeling had to be updated in order

to calculate the impact of the emissions as a result of the increased production rate. The percentage of AAL for each pollutant was increased proportionally based on the increase of the input. See the sample calculation below.

Table 1: TAPs emissions from the dryer

Input: The dryer production rate in 2011: 43.0 ODT/hr
Current dryer production rate: 48 ODT/hr

Pollutant	Emission Factor* (lb/ODT)	3/22/11 Modeling		**Current Operation**		
		Input (lb/hr)	% of AAL	Input (lb/hr)	Input (lb/yr)	**% of AAL**
Acrolein	2.30E-02	0.989	4	1.104	N/A	**4.465**
Benzene	7.6E-03	0.327	26	0.365	3196	**29.01**
Phenol	2.8E-02	1.2	1	1.344	N/A	**1.120**

*AP-42 10.6.2, Table 10.2-3, Rotary dryer, green, direct wood-fired, softwood (inlet moisture content, >50%, dry basis)

- Sample Calculation: Benzene

Emissions in 2011: $7.6E-03\frac{lb}{ODT} \times 43\frac{ODT}{hr} = 0.327\frac{lb}{hr}$

Emissions at the current operation rate: $7.6E-03\frac{lb}{ODT} \times 48\frac{ODT}{hr} = 0.365\frac{lb}{hr}$

$$\%\ of\ AAL\ at\ the\ current\ operation\ rate: \frac{26\%\ of\ AAL * 0.365\ lb/hr}{0.327\ lb/hr} = 29.01\%\ of\ AAL$$

As shown in Table 1, each TAP emissions are below the AAL. Even though the facility reported that the TAP emissions from the dryer are much lower than the emissions from AP-42, this analysis shows even with the most conservative assumptions, the emissions are still under the AAL. Therefore, it demonstrates compliance with 15A NCAC 02D .1100. The monitoring and the recordkeeping conditions associated with 15A NCAC 02D .1100 will be removed. The limit of acrolein, benzene and phenol emissions will be updated accordingly.

In addition to the 2011 modeling, the facility conducted another modeling analysis in January 2015. Acrolein and formaldehyde emissions were two pollutants modeled at this time, optimizing the emissions to 99% of AAL for acrolein. The toxic emission limits in the Permit R03 were based on this 2015 modeling analysis. The acrolein emissions from the dryer used in the 2015 modeling was 2.74 lb/hr, which is higher than calculated maximum emissions of 1.104 lb/hr in Table 1. Because the impacts from both analysis were below the AAL, the limit for acrolein will be unchanged during this modification.

3. <u>15A NCAC 02Q .0711: "Toxic Air Pollutant Emission Rate Requiring a Permit"</u>

Based on the review described in Section 2 above, the only pollutants above the TPER were acrolein, formaldehyde, benzene and phenol. Since the phenol emission limit was added to the TPER list, phenol was removed from the table applicable to 02Q .0711. No recordkeeping, monitoring, or reporting is required in this section.

4. <u>15A NCAC 02Q .0317 "Avoidance Conditions for 15A NCAC 02D .0530, Prevention of Significant Deterioration"</u>

The facility requested to limit the VOC emissions to 391.64 tpy to avoid being subject to PSD conditions for major source. The limit stays the same as well as the monitoring, recordkeeping and reporting requirements for the PSD avoidance conditions.

VI. NSPS, NESHAPS, PSD, Attainment Status, 112(r), CAM

New Source Performance Standards (NSPS)
The facility is subject to 40 CFR Subpart IIII for their emergency engine. See the regulatory review above. No other NSPS conditions apply to the sources located at this facility.

NESHAP/MACT
The facility is an area source of HAPs, and is subject to GACT 4Z for their emergency engine and fire pump. See the regulatory review above.

Prevention of Significant Deterioration (PSD)
This facility has requested limits to be considered a minor source with respect to PSD. See the regulatory review above.

112(r)
The facility does not store any regulated materials in quantities for which Section 112(r) of the Clean Air Act applies.

Compliance Assurance Monitoring (CAM)
According to the application, none of the sources at the Enviva Ahoskie facility are Large PSEUs. Even though NOx and VOC emissions from the dryer system (ID No. ES-DRYER) and the VOC emissions from Pellet Presses and Coolers (ID Nos. ES-CLR1 through 6) are more than 100 tpy, no control devices are installed for these pollutants. Therefore, per §64.5(b), this modification does not trigger a CAM review. CAM for small PSEUs will be reviewed at the next renewal.

VII. Public Notice/EPA and Affected State(s) Review

A notice of the DRAFT Title V Permit shall be made pursuant to 15A NCAC 02Q .0521. The notice will provide for a 30-day comment period, with an opportunity for a public hearing. Copies of the public notice shall be sent to persons on the Title V mailing list and EPA. Pursuant to 15A NCAC 02Q .0522, a copy of each permit application, each proposed permit and each final permit pursuant shall be provided to EPA. Also pursuant to 02Q .0522, a notice of the DRAFT Title V Permit shall be provided to each affected State at or before the time notice provided to the public under 02Q .0521 above.

VIII. Other Regulatory Requirements

- An application fee of $867.00 is required and was included with the application.
- The appropriate number of application copies was received on November 13, 2012 and an amended application was received on June 22, 2015.
- A Professional Engineer's Seal was included in the application (ref. J. Rusty Field, P.E. Seal No. 040609).
- According to the application, the facility does not handle any of the substances subject to 112(r).
- The application was signed by Mr. Royal Smith, Vice President of Operations, on June 18, 2015.

IX. Recommendations

This permit application was reviewed by DAQ to determine compliance with all procedures and requirements. DAQ has determined that this facility is expected to achieve compliance as specified in the permit with all applicable requirements. The applicant and Washington Regional Office (WaRO) were provided a draft permit and recommended the issuance of Air Quality Permit No. 10121T04.

ATTACHMENT

NSPS Subpart IIII and GACT Subpart ZZZZ Requirements

For Emergency Generator (ID No. IES-EG)
15A NCAC 2D .0524 NEW SOURCE PERFORMANCE STANDARDS [40 CFR Part 60 Subpart IIII]

Applicability [15A NCAC 2Q .0508(f), 40 CFR 60.4200(a)(2)(i)]

a. For the emergency generator **(ID No. IES-EG)**, the Permittee shall comply with all applicable provisions, including the requirements for emission standards, notification, testing, reporting, record keeping, and monitoring, contained in Environmental Management Commission Standard 15A NCAC 2D .0524 "New Source Performance Standards (NSPS)" as promulgated in 40 CFR Part 60 Subpart IIII, Standards of Performance for Stationary Compression Ignition Internal Combustion Engines," including Subpart A "General Provisions."

General Provisions [15A NCAC 2Q .0508(f)]

b. Pursuant to 40 CFR 60 .4218, the Permittee shall comply with the General Provisions of 40 CFR 60 Subpart A as presented in Table 8 of 40 CFR 60 Subpart IIII.

Emission Standards [15A NCAC 2Q .0508(f)]

c. The Permittee shall comply with the emission standards 40 CFR 60.4202 for all pollutants, for the same model year and maximum engine power for this engine. [40CFR 60.4205(b)]

Fuel Requirements [15A NCAC 2Q .0508(f)]

d. The Permittee shall use diesel fuel in the engine that meets the requirements of 40 CFR 80.510(b) including:
   i. a maximum sulfur content of 15 ppm; and
   ii. a minimum cetane index of 40 or a maximum aromatic content of 35 volume percent. [40 CFR 60.4207(b)]

Testing [15A NCAC 2Q .0508(f)]

e. If emissions testing is required, the testing shall be performed in accordance with General Condition JJ. If the results of this test are above the limits given in conditions c. and d. above, the Permittee shall be deemed in noncompliance with 15A NCAC 2D .0524.

Monitoring [15A NCAC 2Q .0508(f)]

f. The engine has the following monitoring requirements:
   i. The engines shall be equipped with a non-resettable hour meter prior to startup. [40CFR 60.4209(a)]
   ii. The engine, if equipped with a diesel particulate filter, must be installed with a backpressure monitor that notifies the owner or operator when the high backpressure limit of the engine is approached. [40CFR 60.4209(b)]

Compliance Requirements [15A NCAC 2Q .0508(b)]

g. The Permittee shall:
   i. operate and maintain the engines and control devices according to the manufacturer's emission related-written instructions over the entire life of the engine;
   ii. change only those emission-related settings that are permitted by the manufacturer; and
   iii. meet the requirements of 40 CFR 89, 94 and/or 1068 as applicable. [40CFR 60.4206 and 60.4211(a)]

h. The Permittee shall comply with the emission standards in condition c by purchasing an engine certified to the emission standards in condition c for the same model year and maximum engine power. The engine shall be installed and configured according to the manufacturer's emission-related specifications.
[40CFR 60.4211(c)]

i. In order for the engine to be considered an emergency stationary ICE under this condition, any operation other than emergency operation, maintenance and testing, emergency demand response, and operation in non- emergency situations for 50 hours per year, as described below, is prohibited.
   i. There is no time limit on the use of emergency stationary ICE in emergency situations.
   ii. The Permittee may operate the emergency stationary ICE for any combination of the purposes specified in paragraphs i.ii.(A) through (C) of this condition for a maximum of 100 hours per calendar year. Any operation for non-emergency situations as allowed by paragraph i.iii. of this condition counts as part of the 100 hours per calendar year allowed by this paragraph i.iii.
      (A) Emergency stationary ICE may be operated for maintenance checks and readiness testing, provided that the tests are recommended by federal, state or local government, the manufacturer, the vendor, the regional transmission organization or equivalent balancing authority and transmission operator, or the insurance company associated with the engine. The owner or operator may petition the Administrator for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the owner or operator maintains records indicating that federal, state, or local standards require maintenance and testing of emergency ICE beyond 100 hours per calendar year.
      (B) Emergency stationary ICE may be operated for emergency demand response for periods in which the Reliability Coordinator under the North American Electric Reliability Corporation (NERC) Reliability Standard EOP–002–3, Capacity and Energy Emergencies (incorporated by reference, see 40 CFR 60.17), or other authorized entity as determined by the Reliability Coordinator, has declared an Energy Emergency Alert Level 2 as defined in the NERC Reliability Standard EOP–002–3.
      (C) Emergency stationary ICE may be operated for periods where there is a deviation of voltage or frequency of 5 percent or greater below standard voltage or frequency.
   iii. Emergency stationary ICE may be operated for up to 50 hours per calendar year in non-emergency situations. The 50 hours of operation in non-emergency situations are counted as part of the 100 hours per calendar year for maintenance and testing and emergency demand response provided in paragraph i.ii. of this condition. Except as provided in paragraph i.iii.(A) of this condition, the 50 hours per calendar year for non- emergency situations cannot be used for peak shaving or non-emergency demand response, or to generate income for a facility to an electric grid or otherwise supply power as part of a financial arrangement with another entity.
      (A) The 50 hours per year for non-emergency situations can be used to supply power as part of a financial arrangement with another entity if all of the following conditions are met:
         (i) The engine is dispatched by the local balancing authority or local transmission and distribution system operator;
         (ii) The dispatch is intended to mitigate local transmission and/or distribution limitations so as to avert potential voltage collapse or line overloads that could lead to the interruption of power supply in a local area or region.
         (iii) The dispatch follows reliability, emergency operation or similar protocols that follow specific NERC, regional, state, public utility commission or local standards or guidelines.

(iv) The power is provided only to the facility itself or to support the local transmission and distribution system.
(v) The owner or operator identifies and records the entity that dispatches the engine and the specific NERC, regional, state, public utility commission or local standards or guidelines that are being followed for dispatching the engine. The local balancing authority or local transmission and distribution system operator may keep these records on behalf of the engine owner or operator. [40CFR 60.4211(f)]

The Permittee shall be deemed in noncompliance with 15A NCAC 2D .0524, if the requirements in conditions f through i are not met.

Recordkeeping [15A NCAC 2Q .0508(f)]

j. To assure compliance, the Permittee shall perform inspections and maintenance on the engine as recommended by the manufacturer per 40 CFR 60.4206 and 40 CFR 60.4211(a). The results of inspection and maintenance shall be maintained in a logbook (written or electronic format) on-site and made available to an authorized representative upon request. The logbook shall record the following:
   i. the date and time of each recorded action;
   ii. the results of each inspection;
   iii. the results of any maintenance performed on the engine;
   iv. any variance from manufacturer's recommendations, if any, and corrections made;
   v. the hours of operation of the engine in emergency and non-emergency service. [40 CFR 60.4214(b)]
   vi. if a PM filter is used, records of any corrective action taken after the backpressure monitor has notified the owner or operator that the high backpressure limit of the engine is approached [40 CFR60.4214(c)]; and
   vii. documentation from the manufacturer that the engine is certified to meet the emission standards in condition c.

   The Permittee shall be deemed in noncompliance with 15A NCAC 2D .0524 if these records are not maintained.

Reporting [15A NCAC 2Q .0508(f)]

k. The Permittee shall submit a summary report of monitoring and recordkeeping activities postmarked on or before January 30 of each calendar year for the preceding six-month period between July and December and July 30 of each calendar year for the preceding six-month period between January and June. All instances of noncompliance with the requirements of this permit shall be clearly identified.

15A NCAC 2D .1111: MAXIMUM ACHIEVABLE CONTROL TECHNOLOGY
[40 CFR Part 63 Subpart ZZZZ] – New Stationary RICE located at an Area Source of HAP Emissions

Applicability [40 CFR 63.6585, 6590(a)(2)(iii)]

a. For the emergency generator (**ID No. IES-EG**), the Permittee shall comply with all applicable provisions, including the monitoring, recordkeeping, and reporting contained in Environmental Management Commission Standard 15A NCAC 2D .1111 "Maximum Achievable Control Technology" (MACT) as promulgated in 40 CFR 63, Subpart ZZZZ, "National Emission Standards For Hazardous Air Pollutants For Stationary Reciprocating Internal Combustion Engines located at Area Sources" and Subpart A "General Provisions."

Stationary RICE subject to Regulations under 40 CFR Part 60 [15 A NCAC 2Q. 0508(f)]

b. Pursuant to 40 CFR 63.6590(c)(1), the emergency generator (**ID No. ES-EG)** must meet the requirements of 40 CFR 63 Subpart ZZZZ and Subpart A by meeting the requirements of 40 CFR part 60 subpart IIII. No further requirements apply for this engine under 40 CFR 63 Subpart ZZZZ and Subpart A.

For Fire Water Pump (ID No. IES-FWP)
15A NCAC 2D .1111: MAXIMUM ACHIEVABLE CONTROL TECHNOLOGY
[40 CFR Part 63 Subpart ZZZZ] – Existing Stationary RICE located at an Area Source of HAP Emissions

Applicability [40 CFR 63.6585, 63.6590(a)(1)(iii)]

a. For the fire water pump (**ID No. IES-FWP**), the Permittee shall comply with all applicable provisions, including the monitoring, recordkeeping, and reporting contained in Environmental Management Commission Standard 15A NCAC 2D .1111 "Maximum Achievable Control Technology" (MACT) as promulgated in 40 CFR 63, "Subpart ZZZZ—National Emissions Standards for Hazardous Air Pollutants for Stationary Reciprocating Internal Combustion Engines located at Area Sources" and Subpart A "General Provisions."

Definitions and Nomenclature

a. For the purposes of this permit condition, the definitions and nomenclature contained in 40 CFR 63.6675 shall apply.

General Provisions [40 CFR 63.6665]

c. The Permittee shall comply with the General Provisions as applicable pursuant to Table 8 of 40 CFR 63 Subpart ZZZZ.

Operating and Maintenance Requirements [15A NCAC 2Q .0508(b)]

d. During periods of startup of the IC engine, the Permittee shall minimize the engine's time spent at idle and minimize the engine's startup time at startup to a period needed for appropriate and safe loading of the engine, not to exceed 30 minutes, after which time the non-startup emission limitations apply. [40 CFR 63.6603(a), Table 2d and 63.6625(h)]

e. Except during periods of startup of the IC engine, the Permittee shall:
   i. Change oil and filter every 500 hours of operation or annually, whichever comes first;
   ii. Inspect air cleaner every 1,000 hours of operation or annually, whichever comes first; and
   iii. Inspect all hoses and belts every 500 hours of operation or annually, whichever comes first, and replace as necessary. [40 CFR 63.6603(a), Table 2d]

f. The Permittee shall have the option to utilize the oil analysis program as described in 40 CFR 63.6625(i) in order to extend the specified oil change requirement in condition g. [40 CFR 63.6603(a), Table 2d, 63.6625(i)]

g. If an emergency engine is operating during an emergency and it is not possible to shut down the engine in order to perform the management practice requirements on the schedule required in condition e., or if performing the management practice on the required schedule would otherwise pose an unacceptable risk under Federal, State, or local law, the management practice can be delayed until the emergency is over or the unacceptable risk under Federal, State, or local law has abated. The management practice should be performed as soon as practicable after the emergency has ended or the unacceptable risk under Federal, State, or local law has abated. Sources must report any failure to perform the management practice on the schedule required and the Federal, State or local law under which the risk was deemed unacceptable. [40 CFR 63.6603(a), Table 2d]

h. The permittee shall be in compliance with the emission limitations, operating limitations and other requirements that apply at all times. [40 CFR 63.6605(a)]

i. The Permittee shall operate and maintain any affected source, including associated air pollution control equipment and monitoring equipment, in a manner consistent with safety and good air pollution control practices for minimizing emissions. The general duty to minimize emissions does not require you to make any further efforts to reduce emissions if levels required by this standard have been achieved. Determination of whether such operation and maintenance procedures are being used will be based on information available to the Administrator which may include, but is not limited to, monitoring results, review of operation and maintenance procedures, review of operation and maintenance records, and inspection of the source. [40 CFR 63.6605(b)]

j. The Permittee shall operate and maintain the stationary RICE according to the manufacturer's emission-related written instructions or develop a maintenance plan which must provide to the extent practicable for the maintenance and operation of the engine in a manner consistent with good air pollution control practice for minimizing emissions. [40 CFR 63.6625(e) and 63.6640(a), Table 6]

The Permittee shall be deemed in noncompliance with 15A NCAC 2D .1111 if conditions d through j are not met.